Learning Outcomes
While most individuals, organizations, and governments are quick to adopt new technologies, they rarely take the time to consider how that technology is shaping their behaviors and, conversely, how users shape the development of future technologies.

Successful completion of this course will give you the conceptual tools necessary to understand the social, political, and economic factors associated with a networked society. Issues will range from the theoretical (what is information and how do humans construct it?), to the cultural (how are newer communication technologies different from earlier distance-shrinking and knowledge-building technologies such as telephones?), to the technical (what are the basic architectures of computing networks?).

As a core course in the BSIS, this class will also provide you a knowledge-based foundation for future courses in information, technology, and policy.

After successfully completing this course you will be able to:

• Demonstrate knowledge of fundamental concepts and ideas around the rise of the information society.
• Demonstrate critical thinking in evaluating causal arguments regarding the relationship between technology and society, including analyzing major assertions, background assumptions, and explanatory evidence.
• Explain how information & communication technologies (ICTs) shape national and global events.
• Use information technologies to conduct research and to communicate effectively about ICTs.
• Articulate how the historical events leading to the information society have shaped our modern-day use of ICTs.
• Articulate ways technology use can be problematic, and how to harness technology for positive change.
• Work collaboratively to create and disseminate information content broadly.

Required Resources
Course website: elms.umd.edu

We'll be using the mobile/web version of Turning Point instead of physical “clickers.” You must register for a free license through UMD (if you have not done so for a previous class). You can download an app for iOS/Android or use a browser-based version. Visit the Students section of clickers.umd.edu for details.
Campus Policies
It is our shared responsibility to know and abide by the University of Maryland’s policies that relate to all courses, which include topics like:

- Academic integrity
- Student and instructor conduct
- Accessibility and accommodations
- Attendance and excused absences
- Grades and appeals
- Copyright and intellectual property

Please visit [www.ugst.umd.edu/courserelatedpolicies.html](http://www.ugst.umd.edu/courserelatedpolicies.html) for the Office of Undergraduate Studies’ full list of campus-wide policies and follow up with me if you have questions.

Activities and Learning Assessments
Your final grade will be based on the following components.

<table>
<thead>
<tr>
<th>Learning Assessments</th>
<th>#</th>
<th>Weight</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Content Quizzes</strong> (CQ): pre-class quizzes submitted on ELMS</td>
<td>13</td>
<td>10%</td>
</tr>
<tr>
<td><strong>Learning Checks</strong> (LC): in-class “clicker” quizzes and in-class activities (top 20 grades)</td>
<td>~20</td>
<td>15%</td>
</tr>
<tr>
<td><strong>Interactive Learning &amp; Reflection Assignments</strong> (ILRA): activities with short writing assignments</td>
<td>5-7</td>
<td>25%</td>
</tr>
<tr>
<td><strong>Exams</strong> (EX)</td>
<td>2</td>
<td>35%</td>
</tr>
<tr>
<td><strong>Group Project</strong> (GP): Viral content project</td>
<td>1</td>
<td>15%</td>
</tr>
<tr>
<td><strong>Extra Credit</strong> (EC): Up to 3% potential extra credit</td>
<td>???</td>
<td>~3%</td>
</tr>
</tbody>
</table>

- **Content Quizzes (10%; due Sundays or Tuesdays at midnight).** To help you evaluate how well you understand the assigned reading(s) each week, quizzes on ELMS will be due before/during the week that has new readings. There will be approximately 13 quizzes worth up to 10 points each; only your top 10 grades will be counted.

- **Learning Checks / In-Class Activities (15%; multiple dates).** Throughout the semester, we will regularly have in-class activities, clicker questions, and online ELMS quizzes to reinforce class content. These activities will be graded as participation; that is, they are pass (you were present and participated) or fail (you did not participate). Only 15 activities will count toward your grade. You will not be able to make up the activities if you miss a day.

- **Interactive Learning & Reflection Assignments (25%; multiple dates).** Several assignments will consist of a “real world” activity, combined with a 250-600 word reflection on the experience. These “ILRAs” will be assigned at various points throughout the semester.

- **Viral Content Team Project (15%, multiple dates).** Note that there will be an individual peer review component of the group project to identify social loafing—group members who do not pull their weight may receive a different grade than the rest of the group.
  - **GP-01: Meme Proposal (4%, TBD)** – Your team will develop two potential memes and present them both in a short paper. Within the paper, your team should provide a rationale for why you believe that your proposed memes will go viral, using the concepts that we cover in class to justify your thoughts.
  - **GP-01A: Proposal Peer Review (2%, TBD)** — Individually (not as a group) you will review another team’s meme proposal and provide them with constructive feedback. **NOTE:** Late penalties will be doubled for this assignment, since your peers are counting on your input.
  - **Final Meme (0%, TBD)** — Your group’s final meme must be ready by this date. Your group will begin promoting the meme on **Thursday, 4/19.**
  - **Project Presentation (3%, TBD)** – On **Thursday, 5/3,** one member of your team will give a short (2 minute max) presentation to the class and a brief reflection paper discussing the success or failure
of your meme. The presentation itself must be uploaded to ELMS no later than 11:59 Tuesday, 5/1, so that I can prep the slide decks for Thursday.

- **Project Reflection (6%, TBD)** — Your group will compose a reflection paper discussing the success or failure of your meme.

- **Mid-Term Exam 1 (15%)**. Midterm 1 will cover class content from Weeks 1 through 8. It will consist of multiple-choice questions and short-answer questions worth 100 points.

- **Final Exam (20%)**. The final exam will cover all class content, with an emphasis on content from Weeks 9 through 15. It will consist of multiple-choice questions and short-answer questions worth 100 points.

- **Extra Credit Activities (potentially up to 3%)**. Extra credit activities of varying point values may become available during the semester.

**Grades**

Grades are not given; they are earned. Your grade is determined by your performance on the learning assessments in the course. If earning a particular grade is important to you, please speak with me at the beginning of the semester so that I can offer some helpful suggestions for achieving your goal.

All assessment scores will be posted on the course ELMS page. If you would like to review any of your grades (including the exams), or have questions about how something was scored, please email me to schedule a time for us to meet in my office.

I am happy to discuss any of your grades with you, and if I have made a mistake I will correct it quickly. Any formal grade disputes must be submitted in writing and within one week of receiving the grade.

Final letter grades are assigned based on the percentage of total assessment points earned. To be fair to everyone I have to establish clear standards and apply them consistently, so please understand that being close to a cutoff is not the same this as making the cut (89.99 ≠ 90.00). It would be unethical to make exceptions for some and not others. I do not round grades up, so do not ask me to do this at the end of the semester. I will not respond to email requests for a grade bump at the end of the semester. The cutoffs are as follows:

<table>
<thead>
<tr>
<th>Final Grade Cutoffs</th>
</tr>
</thead>
<tbody>
<tr>
<td>+ 97.00% + 87.00% + 77.00% + 67.00%</td>
</tr>
<tr>
<td>A 94.00% B 84.00% C 74.00% D 64.00% F &lt;60.0%</td>
</tr>
<tr>
<td>- 90.00% - 80.00% - 70.00% - 60.00%</td>
</tr>
</tbody>
</table>

**Late Assignments**

A late penalty will be applied to any assignment that is submitted late (starting one minute beyond the due date and time).

Late assignments will be graded according to the following formula:

\[
[\text{grade on assignment}] \times 0.9^{[\text{number of days late}]}
\]

For example, if you turn in a 10-point assignment 1 day late, and earned a 100% on that assignment, your final grade for that assignment would be \((1.00)(0.9^1)\), or 90%. If you turned in the same assignment 3 days late, and earned an 80%, your grade would be \((0.80)(0.9^3)\), or 58%. Therefore, although your grade will take a serious hit if the assignment is late, in this class it is always better to turn in an assignment late than to not do it at all.

Please prepare in advance so that you will not encounter technical difficulties that will result in your work receiving a late penalty. **Technical difficulties are not an excuse for late assignments.** If you have a conflict with the due date, assignments can always be submitted early. **Generally speaking, illnesses are not an excuse for late assignments** because you will receive the assignments at least one week before they are due.

**If you know you will not be able to meet an assignment deadline**, contact me before the due date to explain why you will need to submit the assignment late; these will be evaluated on a case-by-case basis. Note that **in-class**
activities and learning checks cannot be made up; however, only 20 will count toward your final grade, giving you some leeway for missed classes.

Exam Policy
If you need to miss an exam because of outside circumstances (e.g., a religious holiday, military duties, work/athletic team travel), you must email me before the drop/add period ends (September 10) to reschedule your exam time. If you are sick on an exam day, you must provide me with a doctor’s note to be excused (see the UMD policies on absences) and should email me before the exam time to let me know you’re sick. If you miss an exam due to other circumstances (e.g., oversleeping), you will not be able to make up the exam.

Collaboration, Group Work, and Academic Integrity in INST 201
All of the individually graded assessments must be completed independently. You are welcome (and highly encouraged) to study and discuss the course material with your classmates, but providing or receiving quiz/exam answers or letting someone else contribute to your writing assignment constitutes academic dishonesty. Penalties for academic dishonesty can include a 0 on the assignment or an automatic failure and “XF” on your transcript.

For the group project assignments, you should collaborate with members of your group (but not other groups).

Online content checks (CC) are open-book. That is, you should consult the readings or your notes (but not another person) as you take the quiz. Exams (EX) and in-class Learning Checks (LC) are closed-book.

University of Maryland Code of Academic Integrity
The University of Maryland, College Park has a nationally recognized Code of Academic Integrity, administered by the Student Honor Council. This Code sets standards for academic integrity at Maryland for all undergraduate and graduate students. As a student you are responsible for upholding these standards for this course. It is very important for you to be aware of the consequences of cheating, fabrication, facilitation, and plagiarism. For more information on the Code of Academic Integrity or the Student Honor Council, please visit http://shc.umd.edu/SHC/Default.aspx.

Accommodations
Students with disabilities should inform me of their needs at the beginning of the semester. Please also contact the Disability Support Services (301-314-7682 or http://www.counseling.umd.edu/DSS/). DSS will make arrangements with the student and me to determine and implement appropriate academic accommodations. Inclusion is one of the iSchool’s core values, and we have attempted to make all materials and assignments accessible to people with varying abilities. However, if there is something else I can do to make the class more accessible please schedule a time to come talk to me. This will benefit not only yourself but also future students!

Get Some Help!
You are expected to take personal responsibility for your own learning. This includes acknowledging when your performance does not match your goals and doing something about it. Everyone can benefit from some expert guidance on time management, note taking, and exam preparation, so I encourage you to consider visiting http://ter.ps/learn to schedule an appointment with an academic coach. Sharpen your communication skills (and improve your grade) by visiting http://ter.ps/writing and schedule an appointment with the campus Writing Center. Finally, if you just need someone to talk to, visit http://www.counseling.umd.edu.

Everything is free because you have already paid for it, and everyone needs help… all you have to do is ask for it.

Names/Pronouns and Self Identifications
The University of Maryland recognizes the importance of a diverse student body, and we are committed to fostering equitable classroom environments. I invite you, if you wish, to tell us how you want to be referred to both in terms
of your name and your pronouns (he/him, she/her, they/them, etc.). The pronouns someone indicates are not necessarily indicative of their gender identity. Visit trans.umd.edu to learn more.

Additionally, how you identify in terms of your gender, race, class, sexuality, religion, and dis/ability, among all aspects of your identity, is your choice whether to disclose (e.g., should it come up in classroom conversation about our experiences and perspectives) and should be self-identified, not presumed or imposed. I will do my best to address and refer to all students accordingly, and I ask you to do the same for all of your fellow Terps.

**Students in Need**

If you feel you are encountering psychological problems that hamper your course work, please refer to the Counseling Center (301-314-7651 or http://www.counseling.umd.edu/) for expert help. For more information on UMD’s Student Services, see http://www.studentaffairs.umd.edu/student-life.

If you or someone you know feels unsafe, the university has resources (see list below). Read more about hate-based crimes here: https://ocrsm.umd.edu/files/Hate_Bias_FAQs_final.pdf.

<table>
<thead>
<tr>
<th>Name</th>
<th>Phone</th>
<th>Website</th>
</tr>
</thead>
<tbody>
<tr>
<td>University Counseling Center</td>
<td>301-314-7651</td>
<td><a href="http://www.counseling.umd.edu">www.counseling.umd.edu</a></td>
</tr>
<tr>
<td>University Health Center and Mental Health Services</td>
<td>301-314-8180</td>
<td><a href="http://www.health.umd.edu">www.health.umd.edu</a></td>
</tr>
<tr>
<td>University of Maryland Chaplains</td>
<td></td>
<td>thestamp.umd.edu/memorial_chapel/chaplains</td>
</tr>
<tr>
<td>Office of Civil Rights and Sexual Misconduct</td>
<td>301-405-1142</td>
<td><a href="http://www.oersm.umd.edu">www.oersm.umd.edu</a></td>
</tr>
</tbody>
</table>

**Tips for a Successful Semester**

(Adapted from Dr. Vitak’s Tips for a Successful Semester by Jessica Vitak.)

1. Come to class prepared. This includes completing any assignments and readings before class.
2. Take the worksheet quizzes seriously. They aren’t worth many points but they are excellent practice for the exams.
3. Struggling to keep up with all the reading? Check out How to Read a Book, which provides highly useful advice on reading quickly without losing comprehension.
4. Struggling with classes in general? Talk to me, friends, family, and/or the counseling center. I will work with you to help you succeed.
5. Engage in class discussions. Ask questions. Share your opinions. Be open to others’ viewpoints, even if they’re different than your own.
6. Have a question outside of class? Email me anytime. Make sure to include the course number (INST201) in the subject line to ensure I see it. I will respond within 48 hours. Do not email me multiple times if I have not responded and less than 48 hours have passed. After that time, please send me a reminder email.
7. Visit me during my office hours to talk about course content or anything else on your mind.
8. Know your rights as an undergraduate student at UMD: University of Maryland Policies for Undergraduate Students
9. Have fun!
<table>
<thead>
<tr>
<th>WEEK</th>
<th>TOPIC</th>
<th>REQUIRED READINGS/AUDIO/VIDEO</th>
<th>WHAT'S DUE?</th>
</tr>
</thead>
</table>
| 1    | Introduction | • Intro to the class  
• What is Information? | • Chapter 12 (The Legacy of the Telegraph) in *The Victorian Internet* by Standage (on ELMS)  
• How the Internet Was Invented, Part 1 ([video](#)) and Part 2 ([video](#))  
• Terry Gross interview with Andrew Blum ([audio](#)) | Tuesday, 9/3: CQ-1  
Friday, 9/7: ILRA #1 |
| 2    | History of ICTs | • The Information Society  
• Gutenberg to WWII  
• WWI to Present  
• Chapter 12 (The Legacy of the Telegraph) in *The Victorian Internet* by Standage (on ELMS)  
• How the Internet Was Invented, Part 1 ([video](#)) and Part 2 ([video](#))  
• Terry Gross interview with Andrew Blum ([audio](#)) | | |
| 3    | Literacy in the Digital Age | • Did Media Literacy Backfire? ([Data & Society](#))  
• Fake News Is Not the Only Problem ([Data & Society](#))  
• The Fallacy of the ‘Digital Native’: Why Young People Need to Develop their Digital Skills (on ELMS)  
• Evaluating Wikipedia ([Wikipedia](#))  
• At 15, Wikipedia is Finally Finding Its Way to the Truth ([Wired](#)) | Tuesday, 9/10: CQ-2  
Friday, 9/14: ILRA #2 |
| 4    | New Affordances | • Social Media Update 2016 ([Pew Internet Project](#))  
• Confirmed: Echo chambers exist on social media. So what do we do about them? ([Washington Post](#))  
• Have Smartphones Destroyed a Generation? ([The Atlantic](#)) | Tuesday, 9/17: CQ-3  
Friday, 9/21: ILRA #3  
Group Project's Teams Finalized |
| 5    | Communities & Memes | • “Viral Dreams” Chapter in Terms of Service (on ELMS)  
• Ice Bucket Challenge Funds ALS Breakthrough, Proves Skeptics Wrong  
• Yes, Those Ice Buckets Raised Millions, But There Was No ALS ‘Breakthrough’  
• How 'Pepe the Frog' went from harmless to hate symbol ([LA Times](#))  
• Why ‘viral mills’ like Buzzfeed & Upworthy are content marketing at its worst ([VentureBeat](#)) | Tuesday, 9/24: CQ-4  
Friday, 9/28: ILRA #4  
W, 9/26: ILRA #2 (Wikipedia Critique) |
| 6    | Tech’s Social Impact | • Chapter 4 in Baym’s *Personal Connections in the Digital Age* (on ELMS)  
• Sherry Turkle, Stop Googling, Let’s Talk ([NY Times](#))  
• Response to Turkle ([Made in America](#))  
• Note to Self Podcast: The Case for Infomagical ([audio](#)) | Tuesday, 10/1: CQ-5  
Friday, 10/5: ILRA #5  
F, 10/5: ILRA #3 (Day without Tech) |
| 7    | Managing Information | • Looking for Information by Don Case (on ELMS)  
• Metadata? Thesauri? Taxonomies? Topic Maps! Making Sense of it all (on ELMS)  
• Too Many Choices: A Problem That Can Paralyze ([NY Times](#))  
• Attached to Technology and Paying a Price ([NY Times](#))  
• The Hyperconnected Economy: How the growing interconnectedness of society is changing the landscape for business ([The Economist](#))  
• The Long Tail ([Wired](#))  
• Information economics and the Internet by Coeira (on ELMS) | Tuesday, 10/8: CQ-6  
Friday, 10/12: ILRA #6  
F, 10/12: GP01 |
| 8    | MID-TERM EXAM | • Review Tuesday  
• Exam Thursday | MIDTERM EXAM |
<table>
<thead>
<tr>
<th>WEEK</th>
<th>TOPIC</th>
<th>REQUIRED READINGS/AUDIO/VIDEO</th>
</tr>
</thead>
</table>
| 9    | Privacy & Security | - 2016 Privacy Year in Review ([Winston & Strawn](#))  
- Police seek Amazon Echo data in murder case ([Endgadget](#))  
- Google's Cerf Says “Privacy May Be An Anomaly”. Historically, He's Right ([TechCrunch](#))  
- Securing Your Digital Life like a Normal Person ([Medium](#))  
- The Motherboard Guide to Not Getting Hacked ([Motherboard](#)) |
|      |       | **WHAT'S DUE?** |
| 10   | Data Big and Small | - There’s No Such Thing as Innocuous Personal Data ([Slate](#))  
- Gary Wolf, The Quantified Self (video: [TED Talk](#))  
- Jordan Duffy, The Internet of Things (video: TEDx Talk)  
- The $11 Trillion Internet Of Things, Big Data And Pattern Of Life (POL) Analytics ([Forbes](#))  
- What Is The Internet Of Things -- A Complete Beginner's Guide In 2017 ([Forbes](#))  
- The Promise and Peril Of Big Data ([Aspen Institute](#)) |
|      |       | **WHAT'S DUE?** |
| 11   | Managing & Analyzing Data | - Crash Course Computer Science: Machine learning & artificial intelligence ([YouTube](#) / [PBS](#))  
- The Era of Big Data Must End ([TED Talk](#))  
- The Moral Bias Behind Your Search Results ([TED Talk](#))  
- Algorithmic Accountability Reporting: On The Investigation Of Black Boxes ([Tow Center for Digital Journalism](#))  
- When Algorithms Discriminate ([New York Times](#))  
- The Humans Working Behind the AI Curtain ([Harvard Business Review](#)) |
|      |       | **WHAT'S DUE?** |
| 12   | Politics & Policy | - BIG DATA RESEARCH CREATES ETHICAL CONCERNS [READ OR LISTEN](#)  
- The Most Wanted Man in the World ([WIRED](#))  
- How the NSA Spying Programs Have Changed Since Snowden ([PBS Frontline](#))  
- Taking power through technology in the Arab Spring ([Al Jazeera](#))  
- Beyond the Hashtags report on #BLM: read intro and conclusion ([on ELMS](#))  
- National School Walkout: Interactive of Student Walkouts Across the Country ([NBC News Interactive Visualization](#)) |
|      |       | **WHAT'S DUE?** |
| 13   | Ethical Behavior | - Vitak et al. (2017): Identifying Women's Experiences With and Strategies for Mitigating Negative Effects of Online Harassment ([on ELMS](#))  
- The Real Name Fallacy ([Coral Project](#))  
- Big Data Research Creates Ethical Concerns [READ OR LISTEN](#)  
- Perspectives on Big Data, Ethics, and Society ([on ELMS](#))  
- Fighting online trolls with bots ([The Conversation](#)) |
|      |       | **WHAT'S DUE?** |
| 14   | Novel Interactions | - Eight VR Milestones That Took it from Sci-Fi to your Living Room ([Digital Trends](#))  
- How Augmented Reality is Shaping the Future of Play ([Wired](#))  
- AR has Inherited All the Promise and Hype of VR ([Verge](#)) |
|      |       | **WHAT'S DUE?** |
| 15   | What’s Next? | - Catchup, as needed  
- The “Future of Information” |
|      |       | **WHAT'S DUE?** |
| 16   | Final Exam Review | |